

RAW SEQUENCE LISTING

The Biotechnology Systems Branch of the Scientific and Technical
Information Center (STIC) no errors detected.

Application Serial Number: 10/593,466
Source: 1FWP
Date Processed by STIC: 9/29/06

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IFWP

RAW SEQUENCE LISTING

DATE: 09/29/2006

PATENT APPLICATION: US/10/593,466

TIME: 10:54:25

Input Set : A:\TROP 001 01US SeqList.ST25.txt

Output Set: N:\CRF4\09292006\J593466.raw

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3 <110> APPLICANT: SZKUDLINSKI, Mariusz W.
4   WEINTRAUB, Bruce D.
6 <120> TITLE OF INVENTION: Follicle Stimulating Hormone Superagonists
8 <130> FILE REFERENCE: TROP-001/01US
C--> 10 <140> CURRENT APPLICATION NUMBER: US/10/593,466
C--> 10 <141> CURRENT FILING DATE: 2006-09-19
10 <150> PRIOR APPLICATION NUMBER: PCT/US2005/008960
11 <151> PRIOR FILING DATE: 2005-03-18
13 <150> PRIOR APPLICATION NUMBER: US 60/554,419
14 <151> PRIOR FILING DATE: 2004-03-19
16 <160> NUMBER OF SEQ ID NOS: 24
18 <170> SOFTWARE: PatentIn version 3.3
20 <210> SEQ ID NO: 1
21 <211> LENGTH: 92
22 <212> TYPE: PRT
23 <213> ORGANISM: Homo sapiens
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28 1           5           10           15
31 Phe Phe Ser Gln Pro Gly Ala Pro Ile Leu Gln Cys Met Gly Cys Cys
32           20           25           30
35 Phe Ser Arg Ala Tyr Pro Thr Pro Leu Arg Ser Lys Lys Thr Met Leu
36           35           40           45
39 Val Gln Lys Asn Val Thr Ser Glu Ser Thr Cys Cys Val Ala Lys Ser
40           50           55           60
43 Tyr Asn Arg Val Thr Val Met Gly Gly Phe Lys Val Glu Asn His Thr
44 65           70           75           80
47 Ala Cys His Cys Ser Thr Cys Tyr Tyr His Lys Ser
48           85           90
51 <210> SEQ ID NO: 2
52 <211> LENGTH: 111
53 <212> TYPE: PRT
54 <213> ORGANISM: Homo sapiens
56 <400> SEQUENCE: 2
58 Asn Ser Cys Glu Leu Thr Asn Ile Thr Ile Ala Ile Glu Lys Glu Glu
59 1           5           10           15
62 Cys Arg Phe Cys Ile Ser Ile Asn Thr Thr Trp Cys Ala Gly Tyr Cys
63           20           25           30
66 Tyr Thr Arg Asp Leu Val Tyr Lys Asp Pro Ala Arg Pro Lys Ile Gln
67           35           40           45
70 Lys Thr Cys Thr Phe Lys Glu Leu Val Tyr Glu Thr Val Arg Val Pro
71           50           55           60
74 Gly Cys Ala His His Ala Asp Ser Leu Tyr Thr Tyr Pro Val Ala Thr

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75 65          70          75          80
78 Gln Cys His Cys Gly Lys Cys Asp Ser Asp Ser Thr Asp Cys Thr Val
79          85          90          95
82 Arg Gly Leu Gly Pro Ser Tyr Cys Ser Phe Gly Glu Met Lys Glu
83          100          105          110
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87 <211> LENGTH: 5
88 <212> TYPE: PRT
89 <213> ORGANISM: Artificial Sequence
91 <220> FEATURE:
92 <223> OTHER INFORMATION: Amino terminal extension; potential glycosylation recognition
93 site
95 <400> SEQUENCE: 3
97 Ala Asn Ile Thr Val
98 1          5
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102 <211> LENGTH: 9
103 <212> TYPE: PRT
104 <213> ORGANISM: Artificial Sequence
106 <220> FEATURE:
107 <223> OTHER INFORMATION: Amino terminal extension; potential glycosylation
recognition
108 site
110 <400> SEQUENCE: 4
112 Ala Asn Ile Thr Val Asn Ile Thr Val
113 1          5
116 <210> SEQ ID NO: 5
117 <211> LENGTH: 4
118 <212> TYPE: PRT
119 <213> ORGANISM: Artificial Sequence
121 <220> FEATURE:
122 <223> OTHER INFORMATION: Negatively charged amino acid insert to modify protein half-
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124 <400> SEQUENCE: 5
126 Gly Glu Phe Thr
127 1
130 <210> SEQ ID NO: 6
131 <211> LENGTH: 5
132 <212> TYPE: PRT
133 <213> ORGANISM: Artificial Sequence
135 <220> FEATURE:
136 <223> OTHER INFORMATION: Negatively charged amino acid insert to modify protein half-
life
138 <400> SEQUENCE: 6
140 Gly Glu Phe Thr Thr
141 1          5
144 <210> SEQ ID NO: 7
145 <211> LENGTH: 11
146 <212> TYPE: PRT
147 <213> ORGANISM: Artificial Sequence
149 <220> FEATURE:
150 <223> OTHER INFORMATION: FSH segment with negatively charged amino acid insert to
modify

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156 1          5          10
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162 <213> ORGANISM: Artificial Sequence
164 <220> FEATURE:
165 <223> OTHER INFORMATION: FSH segment with negatively charged amino acid insert to
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166      protein half-life
168 <400> SEQUENCE: 8
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171 1          5          10
174 <210> SEQ ID NO: 9
175 <211> LENGTH: 97
176 <212> TYPE: PRT
177 <213> ORGANISM: Artificial Sequence
179 <220> FEATURE:
180 <223> OTHER INFORMATION: Mutated FSH alpha mature peptide sequence with N-terminal
181      extension
183 <400> SEQUENCE: 9
185 Ala Asn Ile Thr Val Ala Pro Asp Val Gln Asp Cys Pro Glu Cys Thr
186 1          5          10          15
189 Leu Gln Glu Asn Pro Phe Phe Ser Gln Pro Gly Ala Pro Ile Leu Gln
190          20          25          30
193 Cys Met Gly Cys Cys Phe Ser Arg Ala Tyr Pro Thr Pro Leu Arg Ser
194          35          40          45
197 Lys Lys Thr Met Leu Val Gln Lys Asn Val Thr Ser Glu Ser Thr Cys
198          50          55          60
201 Cys Val Ala Lys Ser Tyr Asn Arg Val Thr Val Met Gly Gly Phe Lys
202 65          70          75          80
205 Val Glu Asn His Thr Ala Cys His Cys Ser Thr Cys Tyr Tyr His Lys
206          85          90          95
209 Ser
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215 <212> TYPE: PRT
216 <213> ORGANISM: Artificial Sequence
218 <220> FEATURE:
219 <223> OTHER INFORMATION: Mutated FSH alpha mature peptide sequence with N-terminal
220      extension
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225 1          5          10          15
228 Leu Gln Arg Asn Pro Phe Phe Ser Arg Pro Gly Ala Pro Ile Leu Gln
229          20          25          30
232 Cys Met Gly Cys Cys Phe Ser Arg Ala Tyr Pro Thr Pro Leu Arg Ser
233          35          40          45

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236 Lys Lys Thr Met Leu Val Gln Lys Asn Val Thr Ser Glu Ser Thr Cys
 237 50 55 60
 240 Cys Val Ala Lys Ser Tyr Asn Arg Val Thr Val Met Gly Arg Phe Lys
 241 65 70 75 80
 244 Val Glu Asn His Thr Ala Cys His Cys Ser Thr Cys Tyr Tyr His Lys
 245 85 90 95

248 Ser

252 <210> SEQ ID NO: 11

253 <211> LENGTH: 101

254 <212> TYPE: PRT

255 <213> ORGANISM: Artificial Sequence

257 <220> FEATURE:

258 <223> OTHER INFORMATION: Mutated FSH alpha mature peptide sequence with N-terminal
 259 extension

261 <400> SEQUENCE: 11

263 Ala Asn Ile Thr Val Asn Ile Thr Val Ala Pro Asp Val Gln Asp Cys

264 1 5 10 15

267 Pro Glu Cys Thr Leu Gln Glu Asn Pro Phe Phe Ser Gln Pro Gly Ala

268 20 25 30

271 Pro Ile Leu Gln Cys Met Gly Cys Cys Phe Ser Arg Ala Tyr Pro Thr

272 35 40 45

275 Pro Leu Arg Ser Lys Lys Thr Met Leu Val Gln Lys Asn Val Thr Ser

276 50 55 60

279 Glu Ser Thr Cys Cys Val Ala Lys Ser Tyr Asn Arg Val Thr Val Met

280 65 70 75 80

283 Gly Gly Phe Lys Val Glu Asn His Thr Ala Cys His Cys Ser Thr Cys

284 85 90 95

287 Tyr Tyr His Lys Ser

288 100

291 <210> SEQ ID NO: 12

292 <211> LENGTH: 101

293 <212> TYPE: PRT

294 <213> ORGANISM: Artificial Sequence

296 <220> FEATURE:

297 <223> OTHER INFORMATION: Mutated FSH alpha mature peptide sequence with N-terminal
 298 extension

300 <400> SEQUENCE: 12

302 Ala Asn Ile Thr Val Asn Ile Thr Val Ala Pro Asp Val Gln Asp Cys

303 1 5 10 15

306 Pro Glu Cys Thr Leu Gln Arg Asn Pro Phe Phe Ser Arg Pro Gly Ala

307 20 25 30

310 Pro Ile Leu Gln Cys Met Gly Cys Cys Phe Ser Arg Ala Tyr Pro Thr

311 35 40 45

314 Pro Leu Arg Ser Lys Lys Thr Met Leu Val Gln Lys Asn Val Thr Ser

315 50 55 60

318 Glu Ser Thr Cys Cys Val Ala Lys Ser Tyr Asn Arg Val Thr Val Met

319 65 70 75 80

322 Gly Arg Phe Lys Val Glu Asn His Thr Ala Cys His Cys Ser Thr Cys

323 85 90 95

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Input Set : A:\TROP 001 01US SeqList.ST25.txt

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326 Tyr Tyr His Lys Ser
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335 <220> FEATURE:
336 <223> OTHER INFORMATION: Mutated FSH beta mature peptide sequence
338 <400> SEQUENCE: 13
340 Asn Ser Cys Glu Leu Thr Asn Ile Thr Ile Ala Ile Glu Lys Glu Glu
341 1      5      10      15
344 Cys Arg Phe Cys Ile Ser Ile Asn Thr Thr Trp Cys Ala Gly Tyr Cys
345      20      25      30
348 Tyr Thr Arg Asp Leu Val Tyr Lys Asp Pro Ala Arg Pro Lys Ile Gln
349      35      40      45
352 Lys Thr Cys Thr Phe Lys Glu Leu Val Tyr Glu Thr Val Arg Val Pro
353      50      55      60
356 Gly Cys Ala His His Ala Asp Ser Leu Tyr Thr Tyr Pro Asn Ala Thr
357 65      70      75      80
360 Gln Cys His Cys Gly Lys Cys Asp Ser Asp Ser Thr Asp Cys Thr Val
361      85      90      95
364 Arg Gly Leu Gly Pro Ser Tyr Cys Ser Phe Gly Glu Met Lys Glu
365      100      105      110
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369 <211> LENGTH: 111
370 <212> TYPE: PRT
371 <213> ORGANISM: Artificial Sequence
373 <220> FEATURE:
374 <223> OTHER INFORMATION: Mutated FSH beta mature peptide sequence
376 <400> SEQUENCE: 14
378 Asn Ser Cys Arg Leu Thr Asn Ile Thr Ile Ala Ile Glu Lys Glu Glu
379 1      5      10      15
382 Cys Arg Phe Cys Ile Ser Ile Asn Thr Thr Trp Cys Ala Gly Tyr Cys
383      20      25      30
386 Tyr Thr Arg Asp Leu Val Tyr Lys Asp Pro Ala Arg Pro Lys Ile Gln
387      35      40      45
390 Lys Thr Cys Thr Phe Lys Glu Leu Val Tyr Glu Thr Val Arg Val Pro
391      50      55      60
394 Gly Cys Ala His His Ala Asp Ser Leu Tyr Thr Tyr Pro Asn Ala Thr
395 65      70      75      80
398 Gln Cys His Cys Gly Lys Cys Asp Ser Asp Ser Thr Asp Cys Thr Val
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406 <210> SEQ ID NO: 15
407 <211> LENGTH: 111
408 <212> TYPE: PRT
409 <213> ORGANISM: Artificial Sequence
411 <220> FEATURE:

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VERIFICATION SUMMARY

DATE: 09/29/2006

PATENT APPLICATION: US/10/593,466

TIME: 10:54:26

Input Set : A:\TROP 001 01US SeqList.ST25.txt

Output Set: N:\CRF4\09292006\J593466.raw

L:10 M:270 C: Current Application Number differs, Replaced Current Application No

L:10 M:271 C: Current Filing Date differs, Replaced Current Filing Date